Preface
Realizing the Potential of Hospitalist Medicine

Andrew S. Dunn, MD, MPH, SFHM, MACP
Editor

The bar to break even is high, and the goal is not to break even. Hospital medicine has been the fastest growing field in medicine due to multiple factors; none of which are a proven net benefit over the traditional model when the posthospitalization period is considered. A traditional model, which can also be called “historic” in recognition of its current impracticality and rarity, here refers to a primary care physician (PCP) who sees a patient longitudinally over years, provides care as the attending of record while the patient is hospitalized, and seamlessly resumes outpatient care promptly after discharge. It’s hard to argue with the intuitive benefits of the approach.

Kuo and Goodwin1 provided the initial evidence for the comparison between hospitalists and PCPs. They sampled 5% of U.S. medicare patients who were hospitalized and compared outcomes based on the assigned attending. The analysis adjusted for baseline differences between groups through application of a propensity score to a logistic regression model. The study found that patients cared for by hospitalists had shorter length of stay (LOS) and lower hospital charges than patients cared for by their PCP, though patients cared for by their PCP had fewer emergency department visits, fewer readmissions, were more likely to be discharged directly home, and had lower cost in the 30 days after hospitalization than patients cared for by hospitalists.

A larger study by Stevens and colleagues2 shed further light on the different outcomes that may result based on the field of the inpatient physician. These investigators examined over 560,000 medicare admissions and categorized patients as being cared for by their outpatient PCP, a hospitalist, or other generalist (ie, a non-PCP, non-hospitalist physician). The results again demonstrated that PCPs set the standard for outcomes extending beyond the walls of the hospital. Patients cared for by their PCP had higher LOS but were less likely to be discharged to a skilled nursing facility and had lower 30-day mortality than patients cared for by a hospitalist. Notably, only 14% of patients in this national sample were cared for by their PCP during their
hospitalization, highlighting the difficulties PCPs face in providing care for their patients when hospitalized. The study also helps elucidate the impact on patient care and outcomes had a hospitalist model not evolved. Compared with other generalists, patients cared for by hospitalists had lower LOS, were more likely to be discharged home, had fewer readmissions, and had decreased mortality. Hospitalists are clearly providing tremendous value to patients and hospitals.

These studies have limitations. Most notably, the nonrandomized designs may have yielded a sicker population in the hospitalist groups that may not have been fully adjusted for by the logistical analyses. However, taken together, these studies provide the best available evidence of the benefits and challenges of the hospitalist model. The experience, expertise, and focus of career-oriented hospitalists provide benefit for patients while hospitalized and improve important outcomes beyond hospitalization relative to non-PCP physicians. A model where the PCP provides care for hospitalized patients provides the best net outcomes when including the immediate post-hospitalization period.

As hospitalists, we need to aspire to match or surpass the outcomes that can be achieved by a PCP-only model. However, more than individual commitment is needed for the promise of the hospitalist model to be achieved; hospitals and hospital medicine practices need to provide the support and structure for optimal outcomes to be realized. Important components of any group’s plan to improve performance will be retention, development, and a commitment to communication.

Retention is essential for the success of any hospitalist practice. A hospitalist model where physicians cycle through positions does not allow development of the intrahospital relationships, teamwork skills, and expertise required to deliver optimal performance. In his book, “Outliers,” Malcolm Gladwell made popular the notion that 10,000 hours of practice are required for expertise in a field or craft to develop.3 The theory originated in a 1993 paper by psychologist Anders Ericsson that suggested that 10 years are required for expert performance.4 The “10,000-hour rule” has since generated substantial discussion and debate, including over the contribution of innate talent. In addition, it is important to recognize that 10,000 is an average rather than a fixed value. Most relevantly, time needs to be spent in “deliberate practice” rather than simply marking the passing of time. The concept suggests that patients and hospitals greatly benefit by having hospitalists dedicated to lifelong learning working in an environment that promotes development, and that these efforts do not reach fruition for several years. As retention is essential for group success, attention and resources need to focus on areas that will provide a sustainable and nourishing work environment. These efforts should address adequate schedule flexibility, attention to work-life balance, providing meaning in work, opportunities for development and advancement, and fostering community among team members.

Retaining physicians will be a hollow accomplishment without attention to development. The “deliberate practice” framework has direct relevance to hospitalists. A deliberate process that includes an active learning environment will greatly increase the yield in knowledge and skills relative to purely passive processes. As an example, regularly reflecting on clinical decisions, the decision-making process, and outcomes provides tremendous opportunity to expand the knowledge base and illness scripts. Such moments can be great sources of growth, whether considering a diagnosis that was missed or an uncommon diagnosis made promptly.

Explicit efforts in lifelong learning are challenging given the extraordinary workload faced by physicians, though well worth the effort when the right sources are chosen. Reading this issue of the Medical Clinics of North America is a great start. The authors are nationally renowned experts who have provided highly valuable content on core
topics, including congestive heart failure, venous thromboembolism, and teamwork. Busy physicians should also avail themselves of other formats and modalities that best suit their time available and learning needs. Many are fun and invigorating. Some suggestions and examples include the following:

- **Podcasts**: several podcasts focus on clinical decision making through case discussion as small aliquots of information are revealed.
- **Apps**: the human diagnosis app provides brief, challenging case presentations with an opportunity to provide a differential diagnosis, and a set of teaching pearls after the diagnosis is revealed.
- **Clinical case presentations**: read along with the case presentations in major medical journals. A key to increase your yield is to generate your own clinical thinking before you read each set of expert discussant comments.
- **Interactive web-based educational modules**: many specialty societies offer valuable web-based content. The American College of Physician web site’s online learning center has interactive cases, modules on management of opioid use disorder, point-of-care ultrasound, and numerous other topics.
- **Tweetorials**: these are sequences of twitter posts from expert clinicians that provide concise pearls that progress over a series. Physicians who seek content in a fast-paced and potentially interactive format may find tweetorials valuable.

These are just a few examples of the increasingly innovative and varied content that are available to physicians motivated to develop their expertise. Readers are encouraged to find the formats and venues that they find the most fun and feasible and make these educational activities a routine part of their schedule.

Retaining and developing hospitalists are essential strategies to achieving outstanding outcomes. However, regardless of the expertise, there remains an inevitable loss of information from having greater than one physician involved in care. The clear gains from a hospitalist model that occur during hospitalization can be negated by a suboptimal transition of care. One potential solution is to ask hospitalists to commit to routine communication with the outpatient physician. This approach is likely to fail. Most hospitalists are already striving to communicate and provide excellent care. Asking physicians to “work harder” produces little long-term improvement. Rather, systems need to be developed to help remove barriers and promote a culture of communication. Ideally, this includes a shared electronic medical record (EMR). A shared EMR can provide the PCP with automated notification of admissions and discharges; can provide access to notes, including the discharge summary; and can facilitate interprofessional communication, such as through EMR-based secure text messages.

Communication between inpatient and outpatient physicians who are not using a shared EMR is more challenging. Processes that may facilitate communication can include structured admission templates or orders that include the name and contact information of the PCP, and having this information prominently displayed on all EMR patient lists. Structured processes that send discharge summaries to outpatient physicians will enhance communication without imposing a clerical task on the hospitalists. A more burdensome system requires documentation of communication, or the attempt at communication, by the inpatient physician in an auditable field. However, it is far from assured that such a system will improve patient care. Whether the yield is worth the burden needs to be determined locally; adding tasks with little or no proven benefit impedes patient care.
The journey to deliver on the promise of hospital medicine is challenging yet inspiring. I am glad to be able to share the road with so many colleagues with similar interests and aspirations. The authors and I hope you will find this issue valuable on your path.

Andrew S. Dunn, MD, MPH, SFHM, MACP
Division of Hospital Medicine
Mount Sinai Health System
1468 Madison Avenue, Box 1086
New York, NY 10029, USA

E-mail address:
andrew.dunn@mountsinai.org

REFERENCES